CLIPPEDIMAGE= JP402296306A
PAT-NO: JP402296306A
DOCUMENT-IDENTIFIER: JP 02296306 A
TITLE: INDUCTOR

PUBN-DATE: December 6, 1990

INVENTOR-INFORMATION:
NAME
KIMOTO, MITSUO

ASSIGNEE-INFORMATION:
NAME COUNTRY
MITSUBISHI ELECTRIC CORP N/A

APPL-NO: JP01117105
APPL-DATE: May 10, 1989

INT-CL_(IPC): H01F017/00
US-CL-CURRENT: 336/222,336/232

ABSTRACT:
PURPOSE: To make occupancy area small and to obtain great inductance by connecting conductor stripe groups to a substrate in cubic structure by a connection conductor through an insulator above and below.

CONSTITUTION: An insulating film 2a is formed on a substrate 1, and thereon deposition of a conductor film 4 is done, and next the conductor film 4 is patterned, and a lower conductor 3a, which constitutes a first conductor stripe group, is formed. Next, thereon an insulating film 2b is deposited, and from above it a connection hole 5 is formed toward the end of the upper conductor 3a which constitutes the first conductor stripe group, and next from above it a conductor film 6 is deposited, but at this time the conductor film 6 is also deposited in the connection hole 5, and a connection conductor 3c is formed, which connects the lower conductor 3a constituting the first conductor stripe group with the upper conductor 3b constituting the second conductor stripe group. Next, the conductor film 6 is patterned so as to form an upper conductor 3b which constitutes a second conductor stripe group. Hereby, great inductance can be formed with small occupancy area.

CLIPPEDIMAGE= JP360021510A
PAT-NO: JP360021510A
DOCUMENT-IDENTIFIER: JP 60021510 A
TITLE: LAMINATED MAGNETIC CORE FOR STATIONARY INDUCTION ELECTRIC APPARATUS

PUBN-DATE: February 2, 1985

INVENTOR-INFORMATION:
NAME
ONO, YASUNORI
SAITO, TATSU
HAMADATE, YOSHIO
INUI, YOSHIAKI

ASSIGNEE-INFORMATION:

NAME	COUNTRY
HITACHI LTD	N/A

APPL-NO: JP58127747
APPL-DATE: July 15, 1983

INT-CL_(IPC): H01F027/24
US-CL-CURRENT: 336/83

ABSTRACT:
PURPOSE: To improve magnetic characteristics of iron loss, exciting current, noise and the like and reduce the working man-hour and cost by combining at least 2 types of groups of steel plates with a specific method.

CONSTITUTION: Core legs 1 and yokes 2 of a single-phase two-leg core type transformer are overlapped and jointed at overlapping parts 3. Groups 1a, 1b, 1c and 2a, 2b, 2c of steel plates whose edges are trued up are butted from leg side and yoke side and the steel plates are laminated with a repetition of two of 1b, three of 1c, one of 1a, one of 1a, three of 1c and so on to the direction of lamination. When such core is used, a space factor of the steel plates against a whole cross sectional area of the core is 70% on A-A cross section of the figure and also 70% on B-B cross section. Therefore, concentration of flux at the core jointing part is relieved as compared with the conventional core so that iron loss, exciting current and noise can be suppressed.

CLIPPEDIMAGE= JP358033807A
PAT-NO: JP358033807A
DOCUMENT-IDENTIFIER: JP 58033807 A
TITLE: INDUCTANCE ELEMENT

PUBN-DATE: February 28, 1983

INVENTOR-INFORMATION:
NAME
TAKASAKI, TAKETOSHI

ASSIGNEE-INFORMATION:
NAME COUNTRY
NIPPON FERRITE LTD N/A

APPL-NO: JP56132428
APPL-DATE: August 24, 1981

INT-CL_(IPC): H01F015/10; H01F017/04 ; H01F021/06
US-CL-CURRENT: 29/602.1,336/83

ABSTRACT:
PURPOSE: To drastically enhance mechanical strength of a pot core in such a way that the cut-away portion is not provided at the circumference of a pot core.

CONSTITUTION: The projection 11 at the center of pot core 1 is inserted into the hollow portion 22 of coil 2 and the coil 2 sealed with the disk type core 3. The core 3 is provided with the cut-away portions 311, 312, allowing the end portions 6, 28 of the coil 2 to pass therethrough. At the circumference of the core 3, the electrode plate 5 providing the electrode 5 consisting of the insulation plastic 56 and copper is bonded and the end portions 26, 28 of the coil 2 are connected to such electrode. Thereby, mechanical strength of core 1 is drastically improved since the cut-away portion does not exist on the core 1.